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1600

RAW SEQUENCE LISTING
PATENT APPLICATION: **US/09/486,094C**

DATE: 07/21/2003
TIME: 14:54:14

Input Set : **A:\#448532 v1 - A33002-PCT-USA Revised Sequence Listing.txt**
Output Set: **N:\CRF4\07212003\I486094C.raw**

ENTERED

```
 4 <110> APPLICANT: Freyssinet, Georges
 5        Derose, Richard
 6        Hoffman, Jules
 8 <120> TITLE OF INVENTION: GENE CODING FOR ANDOCTONINE, VECTOR
 9        CONTAINING SAME AND TRANSFORMED DISEASE RESISTANT PLANTS
10        OBTAINED
12 <130> FILE REFERENCE: A33002-PCT-USA (0726667.0124)
14 <140> CURRENT APPLICATION NUMBER: 09/486,094C
15 <141> CURRENT FILING DATE: 2000-07-17
17 <150> PRIOR APPLICATION NUMBER: PCT/FR98/01814
18 <151> PRIOR FILING DATE: 1998-08-18
20 <150> PRIOR APPLICATION NUMBER: FR97/10632
21 <151> PRIOR FILING DATE: 1997-08-20
23 <160> NUMBER OF SEQ ID NOS: 17
25 <170> SOFTWARE: FastSEQ for Windows Version 4.0
27 <210> SEQ ID NO: 1
28 <211> LENGTH: 110
29 <212> TYPE: DNA
30 <213> ORGANISM: Androctonus australis
32 <400> SEQUENCE: 1
33 aggtccgtgt gcaggcagat caagatctgc aggaggaggg gtggttgcta ctacaagtgc 60
34 actaacaggc catactgagc tcggcgaggc gaacgtgtcg acggatccgg            110
36 <210> SEQ ID NO: 2
37 <211> LENGTH: 25
38 <212> TYPE: PRT
39 <213> ORGANISM: Androctonus australis
41 <400> SEQUENCE: 2
42 Arg Ser Val Cys Arg Gln Ile Lys Ile Cys Arg Arg Arg Gly Gly Cys
43  1               5                  10                  15
44 Tyr Tyr Lys Cys Thr Asn Arg Pro Tyr
45             20                  25
48 <210> SEQ ID NO: 3
49 <211> LENGTH: 106
50 <212> TYPE: DNA
51 <213> ORGANISM: Androctonus australis
53 <400> SEQUENCE: 3
54 gcgtcgacgc catgggtttc gtgcttttct ctcagcttcc atctttcctt cttgtgtcta 60
55 ctcttcttct tttccttgtg atctctcact cttgccgtgc ggcga            106
57 <210> SEQ ID NO: 4
58 <211> LENGTH: 30
59 <212> TYPE: PRT
60 <213> ORGANISM: Androctonus australis
62 <400> SEQUENCE: 4
```

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```
63 Met Gly Phe Val Leu Phe Ser Gln Leu Pro Ser Phe Leu Leu Val Ser
64 1               5                   10                  15
65 Thr Leu Leu Leu Phe Leu Val Ile Ser His Ser Cys Arg Ala
66             20                  25                  30
69 <210> SEQ ID NO: 5
70 <211> LENGTH: 211
71 <212> TYPE: DNA
72 <213> ORGANISM: Androctonus australis
74 <400> SEQUENCE: 5
75 gcgtcgacgc catgggtttc gtgcttttct ctcagcttcc atctttcctt cttgtgtcta 60
76 ctcttcttct tttccttgtg atctctcact cttgccgtgc caggtccgtg tgcaggcaga 120
77 tcaagatctg caggaggagg ggtggttgct actacaagtg cactaacagg ccatactgag 180
78 ctcggcgagg cgaacgtgtc gacggatccg g                                211
80 <210> SEQ ID NO: 6
81 <211> LENGTH: 55
82 <212> TYPE:. PRT
83 <213> ORGANISM: Androctonus australis
85 <400> SEQUENCE: 6
86 Met Gly Phe Val Leu Phe Ser Gln Leu Pro Ser Phe Leu Leu Val Ser
87 1               5                   10                  15
88 Thr Leu Leu Leu Phe Leu Val Ile Ser His Ser Cys Arg Ala Arg Ser
89             20                  25                  30
90 Val Cys Arg Gln Ile Lys Ile Cys Arg Arg Arg Gly Gly Cys Tyr Tyr
91             35                  40                  45
92 Lys Cys Thr Asn Arg Pro Tyr
93    50                  55
96 <210> SEQ ID NO: 7
97 <211> LENGTH: 75
98 <212> TYPE: DNA
99 <213> ORGANISM: Artificial Sequence
101 <220> FEATURE:
102 <223> OTHER INFORMATION: Synthetic oligonucleotide
104 <400> SEQUENCE: 7
105 gcgtcgacgc gatgggtttc gtgcttttct ctcagcttcc atctttcctt cttgtgtcta 60
106 ctcttcttct tttcc                                                  75
108 <210> SEQ ID NO: 8
109 <211> LENGTH: 72
110 <212> TYPE: DNA
111 <213> ORGANISM: Artificial Sequence
113 <220> FEATURE:
114 <223> OTHER INFORMATION: Synthetic oligonucleotide
116 <400> SEQUENCE: 8
117 tcgccggcac ggcaagagta agagatcaca aggaaaagaa gaagagtaga cacaagaagg 60
118 aaagatggaa gc                                                     72
120 <210> SEQ ID NO: 9
121 <211> LENGTH: 44
122 <212> TYPE: DNA
123 <213> ORGANISM: Artificial Sequence
125 <220> FEATURE:
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RAW SEQUENCE LISTING
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Output Set: **N:\CRF4\07212003\I486094C.raw**

```
126 <223> OTHER INFORMATION: Synthetic oligonucleotide
128 <400> SEQUENCE: 9
129 aggtccgtgt gcaggcagat caagatctgc aggaggaggg gtgg                        44
131 <210> SEQ ID NO: 10
132 <211> LENGTH: 97
133 <212> TYPE: DNA
134 <213> ORGANISM: Artificial Sequence
136 <220> FEATURE:
137 <223> OTHER INFORMATION: Synthetic oligonucleotide
139 <400> SEQUENCE: 10
140 ccggatccgt cgacacgttc gcctcgccga gctcagtatg gcctgttagt gcacttgtag 60
141 tagcaaccac ccctcctcct gcagatcttg atctgcc                              97
143 <210> SEQ ID NO: 11
144 <211> LENGTH: 85
145 <212> TYPE: DNA
146 <213> ORGANISM: Artificial Sequence
148 <220> FEATURE:
149 <223> OTHER INFORMATION: Synthetic oligonucleotide
151 <400> SEQUENCE: 11
152 agggcccct agggtttaaa cggccagtca ggccgaattc gagctcggta cccggggatc 60
153 ctctagagtc gacctgcagg catgc                                          85
155 <210> SEQ ID NO: 12
156 <211> LENGTH: 66
157 <212> TYPE: DNA
158 <213> ORGANISM: Artificial Sequence
160 <220> FEATURE:
161 <223> OTHER INFORMATION: Synthetic oligonucleotide
163 <400> SEQUENCE: 12
164 ccctgaacca ggctcgaggg cgcgccttaa ttaaaagctt gcatgcctgc aggtcgactc 60
165 tagagg                                                              66
167 <210> SEQ ID NO: 13
168 <211> LENGTH: 93
169 <212> TYPE: DNA
170 <213> ORGANISM: Artificial Sequence
172 <220> FEATURE:
173 <223> OTHER INFORMATION: Synthetic oligonucleotide
175 <400> SEQUENCE: 13
176 ccggccagtc aggccacact taattaagtt taaacgcggc cccggcgcgc ctaggtgtgt 60
177 gctcgagggc ccaacctcag tacctggttc agg                                 93
179 <210> SEQ ID NO: 14
180 <211> LENGTH: 93
181 <212> TYPE: DNA
182 <213> ORGANISM: Artificial Sequence
184 <220> FEATURE:
185 <223> OTHER INFORMATION: Synthetic oligonucleotide
187 <400> SEQUENCE: 14
188 ccggcctgaa ccaggtactg aggttgggcc ctcgagcaca cacctaggcg cgccggggcc 60
189 gcgtttaaac ttaattaagt gtggcctgac tgg                                 93
191 <210> SEQ ID NO: 15
```

```
     192 <211> LENGTH: 19
     193 <212> TYPE: PRT
     194 <213> ORGANISM: Androctonus australis
     196 <220> FEATURE:
     197 <221> NAME/KEY: VARIANT
     198 <222> LOCATION: 1
     199 <223> OTHER INFORMATION: Xaa = any amino acid
     201 <221> NAME/KEY: VARIANT
     202 <222> LOCATION: 3
     203 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 205 <221> VARIANT
     206 <222> LOCATION: 4
     207 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 209 <221> VARIANT
     210 <222> LOCATION: 5
     211 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 213 <221> VARIANT
     214 <222> LOCATION: 6
     215 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 217 <221> VARIANT
     218 <222> LOCATION: 7
     219 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 221 <221> VARIANT
     222 <222> LOCATION: 9
     223 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 225 <221> VARIANT
     226 <222> LOCATION: 10
     227 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 229 <221> VARIANT
     230 <222> LOCATION: 11
     231 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 233 <221> VARIANT
     234 <222> LOCATION: 12
     235 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 237 <221> VARIANT
     238 <222> LOCATION: 13
     239 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 241 <221> VARIANT
     242 <222> LOCATION: 15
     243 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 245 <221> VARIANT
     246 <222> LOCATION: 16
     247 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 250 <221> VARIANT
     251 <222> LOCATION: 17
     252 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 254 <221> VARIANT
     255 <222> LOCATION: 19
     256 <223> OTHER INFORMATION: Xaa = any amino acid
```

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```
W--> 258 <400> 15
W--> 259 Xaa Cys Xaa Xaa Xaa Xaa Xaa Cys Xaa Xaa Xaa Xaa Xaa Cys Xaa Xaa Xaa Cys Xaa
     260  1               5                10               15
     262 <210> SEQ ID NO: 16
     263 <211> LENGTH: 21
     264 <212> TYPE: PRT
     265 <213> ORGANISM: Androctonus australis
     267 <220> FEATURE:
     268 <221> NAME/KEY: VARIANT
     269 <222> LOCATION: 1
     270 <223> OTHER INFORMATION: Xaa = any amino acid
     272 <221> NAME/KEY: VARIANT
     273 <222> LOCATION: 5
     274 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 276 <221> VARIANT
     277 <222> LOCATION: 6
     278 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 280 <221> VARIANT
     281 <222> LOCATION: 7
     282 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 284 <221> VARIANT
     285 <222> LOCATION: 11
     286 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 288 <221> VARIANT
     289 <222> LOCATION: 12
     290 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 292 <221> VARIANT
     293 <222> LOCATION: 13
     294 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 296 <221> VARIANT
     297 <222> LOCATION: 17
     298 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 300 <221> VARIANT
     301 <222> LOCATION: 21
     302 <223> OTHER INFORMATION: Xaa = any amino acid
W--> 304 <400> 16
W--> 305 Xaa Val Cys Arg Xaa Xaa Xaa Ile Cys Arg Xaa Xaa Xaa Gly Cys Tyr Xaa
     306  1               5                10               15
     307 Lys Cys Thr Xaa
     308           20
     310 <210> SEQ ID NO: 17
     311 <211> LENGTH: 4
     312 <212> TYPE: PRT
     313 <213> ORGANISM: Androctonus australis
     315 <400> SEQUENCE: 17
     316 Asn Arg Pro Tyr
     317  1
```

RAW SEQUENCE LISTING ERROR SUMMARY   DATE: 07/21/2003
PATENT APPLICATION: **US/09/486,094C**   TIME: 14:54:15

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<u>Please Note:</u>
Use of n and/or Xaa have been detected in the Sequence Listing. Please review the
Sequence Listing to ensure that a corresponding explanation is presented in the <220>
to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:15; Xaa Pos. 1,3,4,5,6,7,9,10,11,12,13,15,16,17,19
Seq#:16; Xaa Pos. 1,5,6,7,11,12,13,17,21

VERIFICATION SUMMARY
PATENT APPLICATION: **US/09/486,094C**

DATE: 07/21/2003
TIME: 14:54:15

Input Set : **A:\#448532 v1 - A33002-PCT-USA Revised Sequence Listing.txt**
Output Set: **N:\CRF4\07212003\I486094C.raw**

```
L:205 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:209 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:213 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:217 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:221 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:225 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:229 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:233 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:237 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:241 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:245 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:250 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:254 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:258 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:15
L:259 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:15 after pos.:0
L:276 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:280 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:284 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:288 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:292 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:296 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:300 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:304 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:16
L:305 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:16 after pos.:0
M:341 Repeated in SeqNo=16
```